IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Applicant: M. Cohen, et al.

Serial No.: 09/250,883

Filed: February 16, 1999

For: Reagents and Methods Useful for Detecting Diseases of the Breast

Attorney Docket No.: 6131.US.C1

Examiner: C. Myers

Group Art Unit: 1655

Certificate of Mailing:
I hereby certify that this paper (along with any paper referred to as being attached or enclosed) is being sent by first class mail to the Commissioner for Patents, Washington D.C., 20231 on March 20, 2002.

Wanda C. Smith

DECLARATION OF EDWARD GRANADOS UNDER 35 U.S.C. SECTION 101

Comissioner for Patents
Washington, D.C. 20231

Sir:

I, Edward Granados, declare:

1. I am one skilled in the art of cancer diagnostics. I have a Ph.D. in chemistry from the State University of New York at Buffalo, and an M.A. and B.A., also in Chemistry, from the State University of New York at Oneonta.

2. I have worked at Abbott Laboratories in the Diagnostics Division for eighteen years. My responsibilities include the development of new diagnostic technologies and the discovery and validation of novel cancer markers to improve the accuracy of diagnosing the onset of cancer.

3. I have also authored numerous patents and publications relating to cancer markers. (See Attachment I).

4. I conducted the homology analysis attached herewith in Exhibit A. Exhibit A illustrates the homology between the GERP nucleotide sequence, which encodes a RING finger protein, and the BS203 nucleotide sequence that is the subject of the above-identified application.

5. I obtained the GERP polynucleotide sequence by downloading the sequence from the NCBI website. I obtained the BS203 polynucleotide sequence from Mr. John Russell, who is employed by Abbott Laboratories and is one of the inventors of the above-identified application.

Contigs were formed using the software program Sequencher (Version 4) which is commercially available from Gene Codes Corporation, 640 Avis Drive, Ann Arbor MI 48108. The GERP sequence and BS203 sequence were loaded as separate files and then joined together by highlighting the file icons simultaneously and then pressing the button called "Assemble Contig."

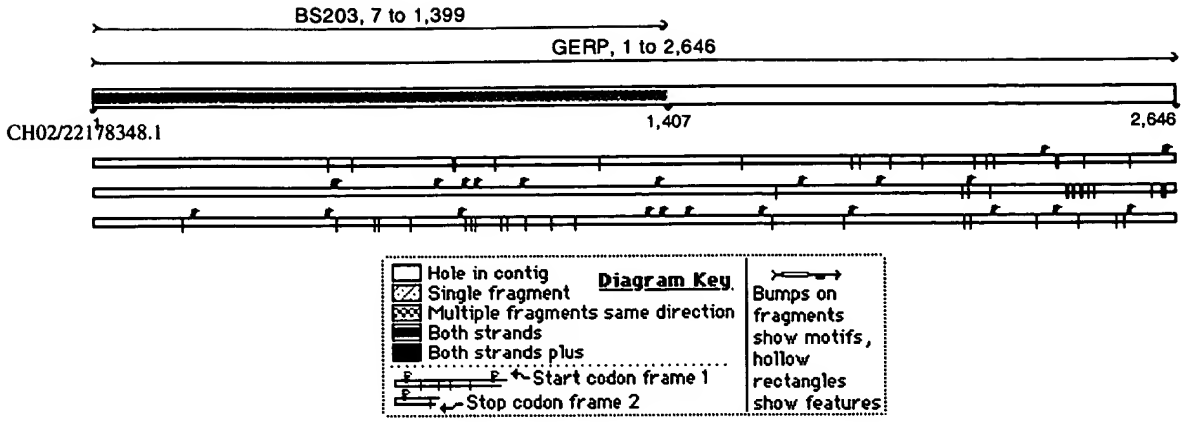
As shown in attached Exhibit A, BS203 represents 1399/1666 (83.9%) of the GERP open reading frame sequence. The remainder of GERP is 3'UTR.

6. I hereby declare that all statements made herein are of my own knowledge are true and that all statements made on information and belief are believed to be true; and further that the statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both under Section 1001 of Title 18 of the United States Code and such willful false statements may jeopardize the validity of the application or any patent issued thereon.

Edward Granados
Edward Granados

3/18/02
Date

EXHIBIT A


BS203, 7 to 1,399
GERP, 1 to 2,646
CH02/22178348.1
1,407
2,646
Diagram Key
Hole in contig
Single fragment
Multiple fragments same direction
Both strands
Both strands plus
Start codon frame 1
Stop codon frame 2
Bumps on fragments show motifs, hollow rectangles show features

ATTACHMENT I

PATENTS

US06203992 03/20/2001 Nucleic acid primers and probes for detecting tumor cells
US06183952 02/06/2001 Reagents and methods useful for detecting diseases of the breast
US06130043 10/10/2000 Reagents and methods useful for detecting diseases of the prostate
US05955268 09/21/1999 Method and reagent for detecting multiple nucleeic acid sequences in a test sample
US05637472 06/10/1997 Hydrazine derivitized cells
US05591598 01/07/1997 Method for quantitating hydrazine groups
US05229268 07/20/1993 Method for diagnostic immunoassay by solid phase separation

PUBLICATIONS

Colpitts TL, Billing-Medel P, Friedman P, Granados EN, Hayden M, Hodges S, Menhart N, Roberts L, Russel J., Stroupe SD. Mammaglobin is found in breast tissue as a complex with BU101. Biochemistry, 2001 Sep 18;40(37):11048-59>

Methylated poly(L-lysine): Conformational effects and interactions with polynucleotides. Bello.J; Granados EN; Lewinski S; Bello HR; Trueheart T. J Biomol Struct Dyn 2(5) p899-913,1985.

Preparation and assay of poly ICL-CM dextran,an interferon inducer of reduced toxicity. Bello J; Granados EN; McGarry M; O'Malley J.Methods Enzymol 119 p103-106,1986.

Purification of carboxymethylcellulose decreases toxicity of poly ICLC in mice.Bello J; O'Malley J; Granados EN. J.Interferon Res 5(3) p429-30,1985.

Poly ICL-CM dextran: An interferon inducer of reduced toxicity.Granados EN; Dawidzik J; O'Malley; McGarry M; Bello J. J Interferon Res 4(2) p155-160, 1984.

Poly ICLC induces anti-IC antibodies in mice and rabbits.Granados EN; Alm; O'Malley: McGarry M; Bello J. J Interferon Res 4(1) p57-62,1984.

Human serum digests poly(rI) . poly(rC) differently from other mammalian sera. Granados EN; Lewinski S; O'Malley J; Bello J.J Interferon Res 4(1) p51-55,1984.

Conformation and aggregation of melittin: Dependence on pH and concentration. Bello J; Bello HR; Granados EN.Biochemistry 21(3) p461-5,1982.

Interactions of poly(trimethylysine) and poly(lysine) with polynucleotides:Circular dichroism and A-T sequence selectivity.Granados,EN;Bello J. Biochemistry 20(16) p4761-4765,1981.

Interactions of poly(trimethyllysine) and poly(ornithine) with polynucleotides:Salt dissociation and thermal denaturization.Granados EN;Bello J.Biochemistry 19(14)p3227-3233,1980.

Alkylated poly-amino part I: Conformational properties of poly-n-epsilon trimethyl-L-lysine and poly-n-delta tri methyl-L-ornithine.Granados EN; Bello.J. Biopolymers 18 (6)p1479-1486,1979.

Enhanced Sensitivity Assay for the TDx Analyzer. Grenier F; Schick B: Granados E; Kolaczkowski L; Pry T. Clin Chem 33 (9) p1570,1987.

TDx-R Digoxin III A non-extraction immunoassay for serum digoxin. Grenier,F Schick B; Granados E; Wang N; Hansen J; Pry T. Clin Chem 33 (6) p923, 1987.